Remarks

Upon entry of the foregoing amendment, claims 1-7, 11, 12, 14, and 24-28 are pending in the application, with 1, 14, and 24 being the independent claims. Claims 17-23 are sought to be cancelled without prejudice to or disclaimer of the subject matter therein. These changes are believed to introduce no new matter, and their entry is respectfully requested.

Based on the following remarks, Applicants respectfully request that the Examiner reconsider all outstanding objections and rejections and that they be withdrawn.

Rejections under 35 U.S.C. § 103

Claims 1-3, 5-7, and 11-12 are rejected under 35 U.S.C. § 103(a) as being obvious over U.S. Patent No. 5,852,866 to Kuettner et al. (hereinafter Kuettner) in view of U.S. Patent No. 5,492,856 to Ikeda et al. (hereinafter Ikeda) and U.S. Patent No. 4,908,328 to Hu *et al.* (hereinafter Hu). Applicants traverse based on the following comments.

Of the above identified references, Kuettner and Ikeda are both directed at inductor circuits, but Hu is directed at a semiconductor process for high voltage semiconductor devices to control large power. (Col. 1, lines 7-13). Based on this, Applicants assert that there is no motivation to combine the power transistor teachings of Hu with the inductor teachings of Kuettner and Ikeda, because one skilled in the art would not consider a power transistor process to identify modifications for an inductor circuit. Accordingly, there is no motivation to combine these references, and therefore the requirements for prima facie obviousness have not been met.

Furthermore, even assuming that there is sufficient motivation to combine, Applicants assert that the cited art fails to teach each and every feature of Applicant's claim 1. Namely, independent claim 1 calls for an integrated circuit inductor having an n+ diffusion layer, *the n+ diffusion layer has a fingered pattern shape with n+ fingers electrically isolated by regions of polysilicon*. The Office Action appears to rely on Hu to teach the mentioned recitation, but without a specific cite to support in the reference.

Upon close examination, Hu does teach an N^+ diffusion ring 29 in a power transistor environment to form a transistor channel. (*See* Hu, col. 4, lines 43-46). However, there is no indication that the N^+ diffusion ring 29 has *a fingered pattern shape with n+ fingers electrically isolated by regions of polysilicon*, as recited in claim 1. Furthermore, the diffusion ring 29 also seems to teach away from the *fingered pattern shape with n+ fingers electrically isolated by regions of polysilicon*, that is recited in Applicants' claim 1. Still further, there is no indication or motivation to translate the teachings of Hu from that of transistor channel formation in a power transistor to providing isolation in an inductor circuit.

For at least the reasons set forth above, Applicants assert that claim 1 is allowable over the cited art, and request that the rejection under 35 U.S.C. § 103(a) be removed and that this claim be passed to allowance. Dependent claims 2-7, and 11-12 are allowable for the same reasons.

Claims 14 and 24-28 are rejected under 35 U.S.C. § 103(a) as being obvious over Kuettner, as modified, as applied to claim 1, and further in view of U.S. Patent No. 5,777,539 to Folker et al. (hereinafter Folker). However, Applicants assert that the Office Action fails to establish a prima facie case of obviousness for at least the reason

that the cited art fails to teach each and every feature of the claimed embodiments of the claimed invention.

The Office Action appears to rely on Folker to teach a spiral inductor metalization pattern having a plurality of conductor lines coupled together at their starting and end points. Claim 14 has been amended to clarify that the *first spiral pattern and the second spiral pattern operate in parallel from the input to the output of the integrated circuit inductor.*

Folker describes an inductor using a multilayered printed circuit board for windings. Through hole vias are spaced around the conductors and pass through the layers. The vias connect the input of one layer to the output of an adjacent layer. (Folker, Figures 2-14). "Thus, the turns are all connected together electrically, *in series* with each other." (Folker, col. 3, line 67 – col. 4, line 2, *emphasis added*).

As discussed, Claim 14 has been amended to clarify that the *first spiral pattern and the second spiral pattern operate in parallel from the input to the output of the integrated circuit inductor*, to further define the invention and distinguish from a series configuration such as Folker. Furthermore, Folker fails to teach or suggest *the first and second inputs connected together by a first via hole of the pattern of via holes, and the first and second outputs connected together by a second via hole of the pattern of via holes*, as recited in claim 14, because doing so would short-out the series inductance provided by the series inductors.

Claim 24 and its respective dependent claims also distinguish over the cited art for reasons similar to those set forth above with respect to claim 14, and further in view of its own features.

For at least the reasons set forth above, Applicants assert that independent claims 14 and 24 are allowable over the cited art, and request that the rejection under 35 U.S.C. § 103(a) be removed and that this claim be passed to allowance.

Conclusion

All of the stated grounds of objection and rejection have been properly traversed, accommodated, or rendered moot. Applicant therefore respectfully requests that the Examiner reconsider all presently outstanding objections and rejections and that they be withdrawn. Applicant believes that a full and complete reply has been made to the outstanding Office Action and, as such, the present application is in condition for allowance. If the Examiner believes, for any reason, that personal communication will expedite prosecution of this application, the Examiner is invited to telephone the undersigned at the number provided.

Prompt and favorable consideration of this Amendment and Reply is respectfully requested.

Respectfully submitted,

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